

Azure End to End Data Pipeline Project

Business Request

The company has identified a lack of visibility into its customer demographics, particularly the gender distribution, and how this may influence purchasing behavior. To address this, stakeholders have requested a comprehensive KPI dashboard powered by the organization's existing customer data stored in an on-premises SQL database.

The dashboard should deliver key insights into product sales segmented by gender and product category, including total units sold, total sales revenue, and a clear gender breakdown of the customer base. It must also feature interactive filters for product category, gender, and a user-friendly date range selector.

Solution Overview

To fulfill this request, we propose building a scalable data pipeline that extracts customer data from the on-premises SQL database, loads it into Azure, and applies necessary transformations to optimize it for querying and analysis. The processed data will populate a custom KPI dashboard tailored to the specified requirements. This pipeline will be configured to run on a daily schedule, ensuring that stakeholders have consistent access to the most current and reliable data.